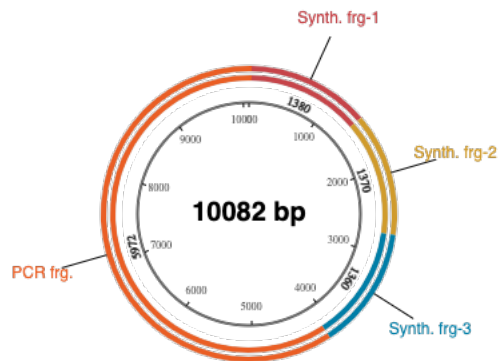


New_Assembly

Created: 12/30/2021, 3:29:12 PM
Saved: not saved

Component Fragments

Name	Length	Produced by	5' End	3' End
Synth. frg-1	1380	Synthetic	---	---
Synth. frg-2	1400	Synthetic	---	---
Synth. frg-3	1390	Synthetic	---	---
PCR frg.	6032	PCR	Fwd Primer (auto)	Rev Primer (auto)



Notes

- For assemblies of 4 or more fragments, we recommend using overlaps of at least 25 bp when using NEBuilder.
- A 60 minute reaction is recommended for the assembly of more than 3 fragments.

Required oligos

Name	Primer 5' (overlap/spacer/ANNEAL) 3'	Len	%GC	3' %GC	3' Tm	3' Ta
PCR frg._fwd	GATCATACTTCGTCTGCG	18	50	50	59.6	60.6
PCR frg._rev	AGTCAGGCAACTATGGATG	19	47	47	61.3	60.6

Build Settings

Property	Value
Product/Kit	#E5520 NEBuilder HiFi DNA Assembly Cloning Kit
Minimum Overlap	20 nt
Minimum Overlap Tm	48 °C
Circularize	Yes
PCR Polymerase/Kit	Q5 High-Fidelity DNA Polymerase
PCR Primer Conc.	500 nM
Min. Primer Length	18 nt

Assembled Sequence

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#DEFINITION  synthetic DNA
#ACCESSION   .
#VERSION     .
#KEYWORDS    NEBuilder
#SOURCE      synthetic DNA construct
# ORGANISM   synthetic DNA construct
#REFERENCE   1 (bases 1 to 10082)
# AUTHORS    .
# TITLE      NEBuilder-generated Construct
# JOURNAL     Exported 30-DEC-2021 from NEBuilder https://nebuilder.neb.com
#COMMENT     NEBuilder-generated oligos (UPPERCASE = gene-specific, lowercase = overlap)
#COMMENT     PCR frg._fwd: GATCATACTTCGTCTGCG
#COMMENT     PCR frg._fwd 3'Tm: 59.6 3'Ta: 60.6
#COMMENT     PCR frg._rev: AGTCAGGCAACTATGGATG
#COMMENT     PCR frg._rev 3'Tm: 61.3 3'Ta: 60.6
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#                     /plasmid="New_Assembly"
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#     gene            4111..29
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#                     /note="gene-specific Tm: 59.6 Ta: 60.6"
#                     /note="gene-specific primer: GATCATACTTCGTCTGCG"
#     primer_bind     complement(12..30)
#                     /note="PCR frg._rev"
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#                     /note="gene-specific primer: AGTCAGGCAACTATGGATG"
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